

<b>Notice of Allowability</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/643,237	KASS ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Elizabeth A. Bolden	1755	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1.  This communication is responsive to the amendment filed 26 May 2006.
2.  The allowed claim(s) is/are 2-14.
3.  Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a)  All    b)  Some\*    c)  None    of the:
    1.  Certified copies of the priority documents have been received.
    2.  Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
    3.  Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.  
**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

4.  A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5.  CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
  - (a)  including changes required by the Notice of Draftsperson's Patent Drawing Review ( PTO-948) attached
    - 1)  hereto or 2)  to Paper No./Mail Date \_\_\_\_\_.
  - (b)  including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6.  DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

#### Attachment(s)

1.  Notice of References Cited (PTO-892)
2.  Notice of Draftsperson's Patent Drawing Review (PTO-948)
3.  Information Disclosure Statements (PTO-1449 or PTO/SB/08),  
Paper No./Mail Date \_\_\_\_\_
4.  Examiner's Comment Regarding Requirement for Deposit  
of Biological Material
5.  Notice of Informal Patent Application (PTO-152)
6.  Interview Summary (PTO-413),  
Paper No./Mail Date \_\_\_\_\_.
7.  Examiner's Amendment/Comment
8.  Examiner's Statement of Reasons for Allowance
9.  Other \_\_\_\_\_.

**DETAILED ACTION*****Response to Arguments***

Applicant's arguments, see pages 17-18, filed 26 May 2006, with respect to the rejection of claims 1 and 9-14 over Smalley et al. and Yamashita et al. have been fully considered and are persuasive. The rejection of claims 1 and 9-14 has been withdrawn since the amendment cancels claims 1. Smalley et al fails to disclose or suggest the glass as recited in independent claim 2, specifically the SiO<sub>2</sub> and Na<sub>2</sub>O contents as recited in the instant claims. Yamashita et al. fails to disclose or suggest the glass as recited in independent claim 2, specifically the Na<sub>2</sub>O content as recited in the instant claims.

Applicant's arguments, see pages 11-14, filed 26 May 2006, with respect to the rejection of claims 1-14 over Baak et al. have been fully considered and are persuasive. Applicant's argue that the glass of Baak et al. does not disclose or suggest the instant invention since compositional ranges of Baak et al. are taught in terms of mole percent and can not readily be converted to weight percent ranges. The Examiner agrees that there is no simple manipulation to convert ranges in mole percent to weight percent. When the examples of Baak et al. are converted from mole percent to weight percent none of the examples of Baak et al. anticipate the compositional limitations of the instant invention. Furthermore, several of the examples contain Al<sub>2</sub>O<sub>3</sub> or have CaO and BaO in quantities greater then allowed for in the instant invention. When looking at the examples of Baak et al. in totality the examples teach away from the instant invention since the glass of the instant invention is free of aluminum and requires specific proportions of Na<sub>2</sub>O and K<sub>2</sub>O and limits the following components to 1 weight percent or less: Li<sub>2</sub>O, CaO, BaO, ZnO, and TiO<sub>2</sub>.

Applicant's arguments, see pages 14-16, filed 26 May 2006, with respect to the rejection of claims 1-14 over Mennemann et al. have been fully considered and are persuasive. Applicant's argue that the glass of Mennemann et al. does not disclose or suggest the instant invention since compositional ranges of Mennemann et al. are very broad weight percent ranges. None of the examples of Mennemann et al. anticipate the

compositional limitations of the instant invention. Furthermore, only 3 of the 19 examples do not contain Al<sub>2</sub>O<sub>3</sub>. When Al<sub>2</sub>O<sub>3</sub> is not present in the glass of the examples of Mennemann et al. the amount of SiO<sub>2</sub> and B<sub>2</sub>O<sub>3</sub> does not fall within the ranges of the instant invention. When looking at the examples of Mennemann et al. in totality the examples teach away from the instant invention since the glass of the instant invention is free of aluminum and requires specific proportions of Na<sub>2</sub>O and K<sub>2</sub>O and limits the following components to 1 weight percent or less: Li<sub>2</sub>O, CaO, BaO, ZnO, and TiO<sub>2</sub>.

#### ***Allowable Subject Matter***

Claims 2-14 are allowed.

#### ***Reason for Allowance***

The prior art fails to disclose or suggest a glass composition having the composition as recited in the instant claims; specifically the instant glass does not contain aluminum in any form. See Applicants arguments pages 9 and 10. The instant borosilicate glass requires SiO<sub>2</sub>, B<sub>2</sub>O<sub>3</sub>, K<sub>2</sub>O, and ZrO<sub>2</sub> and recites specific narrow ranges of components limited to a maximum of 3 weight percent or less of Na<sub>2</sub>O, Li<sub>2</sub>O, CaO, BaO, ZnO, TiO<sub>2</sub>, CeO<sub>2</sub>, and F<sup>-</sup>.

The closest prior art is deemed to be the prior art listed above. The prior art above does not teach or suggest the instant invention for the reasons stated above.

#### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Elizabeth A. Bolden whose telephone number is 571-272-1363. The examiner can normally be reached on 10 am to 8:30 pm every Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorendo can be reached on 571-272-1233. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 1755

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

EAB

8 June 2006



J.A. LORENZO  
SUPERVISORY PATENT EXAMINER